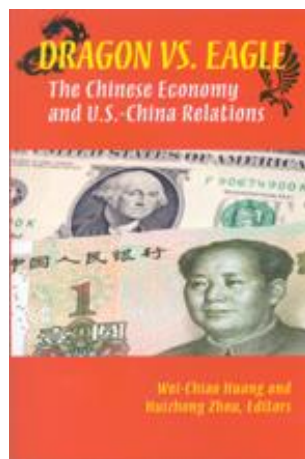

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7

China in 2049

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The People's Republic of China was founded in 1949, and its current economic reforms were implemented beginning in 1978 following the end of the Cultural Revolution. Since then, China has become an economic powerhouse, neatly timing the advent of globalization and organized free trade.

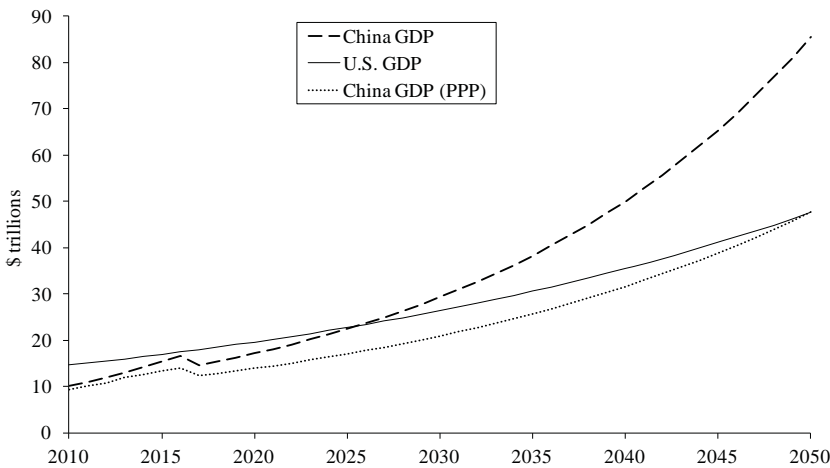
The purpose of this chapter is to examine historical trends in, and the impact of, modern reforms on the Chinese economy; to look at what is likely to happen to growth, earnings, and savings over the next four decades; and to compare the Chinese economy to the U.S. economy over this period of time.

THE BIG PICTURE

Figure 7.1 shows a likely growth pattern of the Chinese economy in the coming decades. It depicts three different phases. The initial phase goes from 2010 to 2016, during which no major shifts in the growth model of the Chinese economy will likely occur. Growth continues at a rate of about 8.5 percent per year despite the likelihood that the Chinese government will implement substantial changes in policies relating to investments, exports, and domestic consumption that could impact growth. Although there is much talk in the Chinese media about how reforms in these sectors will have a negative effect, it is unlikely such reforms will have much negative impact due to political reasons and other complications.

It is presumed that, in 2016, there will be a peak of the Chinese economy in the real term followed by a downturn—the second phase—of 12 percent in the year 2017. Why a 12 percent decline? This predic-

Figure 7.1 Possible Future Path for the United States and China



NOTE: Assumptions: China's GDP grows at 8.5 percent until 2016, declines by 12 percent in 2017, and then at 5.5 percent a year thereafter; U.S. grows at 3 percent a year.

tion is inferred from the Asian financial crisis that occurred in 1998. There are many similarities between the current Chinese economy and the Korean economy during that period. As shown in Figure 7.2, per capita GDP in Korea rose sharply during the first half of the 1990s only to drop precipitously beginning in 1997. I assume a similar pattern will occur in the Chinese economy.

However, it should be noted that other organizations predict continued, steady growth during this period. For instance, the Conference Board (2012) projects growth at 8.0 percent in 2012, 6.0 percent annually in 2013–2016, and 3.5 percent annually in 2017–2025.

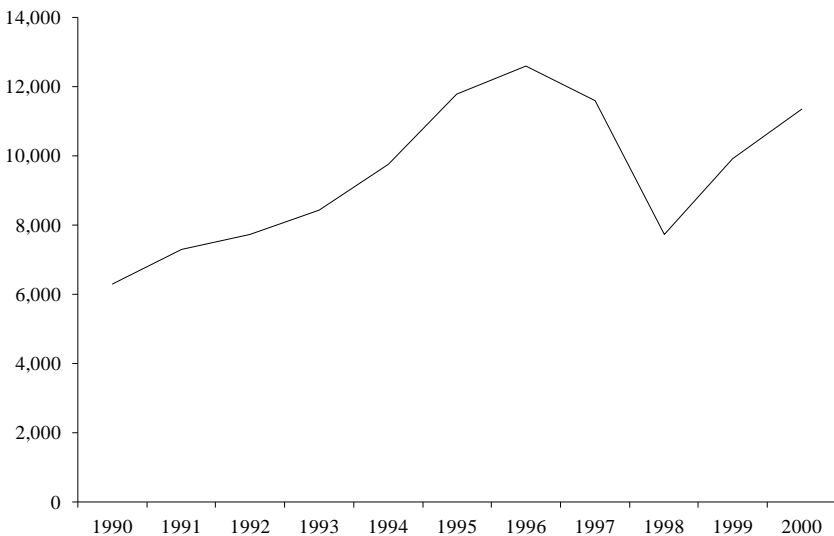
After the setback in 2017, the Chinese economy should resume its growth—the third phase. When this occurs, beginning in 2017–2018, the growth rate should be 5–6 percent per year through 2049. The International Monetary Fund (IMF) projects average annual growth of 5.56 percent for years 2009–2050 (Dadush and Stancil 2009). During this same period, some analysts predict that the U.S. economy would grow at 3 percent per year, which is possibly an optimistic prediction considering its unsteady growth rate in recent years. The IMF projects an

annual growth rate for the United States of 2.7 percent over the same period.

The resumption of growth should occur due to socially and politically acceptable reforms that commonly take place in any economy, including the U.S. economy and the economies of other advanced nations, when hit by crisis. In fact, a looming economic crisis is partly what spurred the reformers led by Deng Xiaoping to undertake major political and economic reforms in 1978 just after the Mao-era Cultural Revolution, during which many people were displaced or lost their lives or property for proposing political and economic changes. Without Deng's reforms, the Chinese economy and society overall would not have evolved to what it is today.

Even now, China's economy is heavily influenced by its major policymakers. Fundamentally, there should be incentives for major political, economic, and cultural changes to a society. From 1979 to 2009, China's leaders were prompted to implement reforms in these

Figure 7.2 GDP per Capita for Korea, 1990–2000 (current \$)



SOURCE: EconStats (2012).

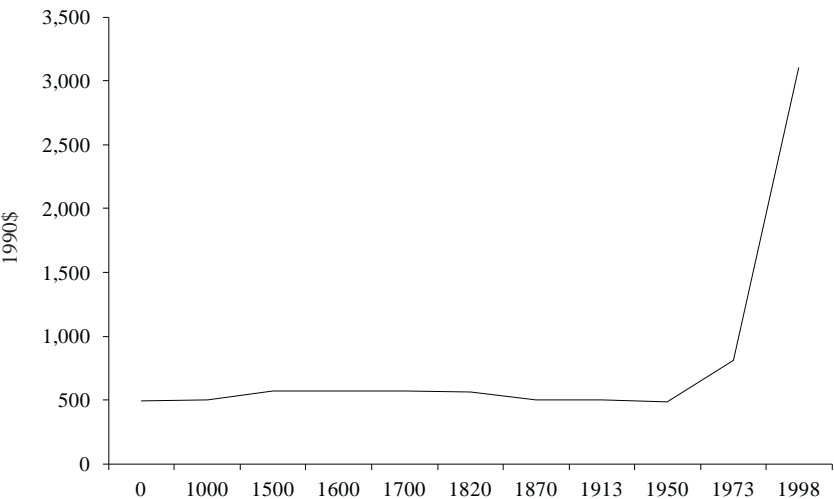
areas in order to maintain strong and continued economic growth, and I predict they will continue this process even after 2017–2018.

As seen in Figure 7.1, in 2049, China’s nominal GDP should surpass the United States’ nominal GDP, under the *ceteris paribus* assumption that the RMB-dollar exchange rate remains relatively stable over time. If purchasing power parity (PPP) is taken into account, China’s GDP is projected to surpass the United States’ GDP in 2027, about 22 years earlier than in the nominal term.

HISTORICAL PERSPECTIVE

Let us take a historical look at the Chinese economy using Figure 7.3. The per capita GDP of China up until 1950 was almost stagnant and remained around \$500 per annum. From 1950 to 1973, the GDP per capita per annum increased about 60 percent, and from 1973 to 1998 it increased by about 300 percent. Furthermore, it continued to grow so

Figure 7.3 China’s per Capita GDP over 2000 Years



SOURCE: Maddison (2001).

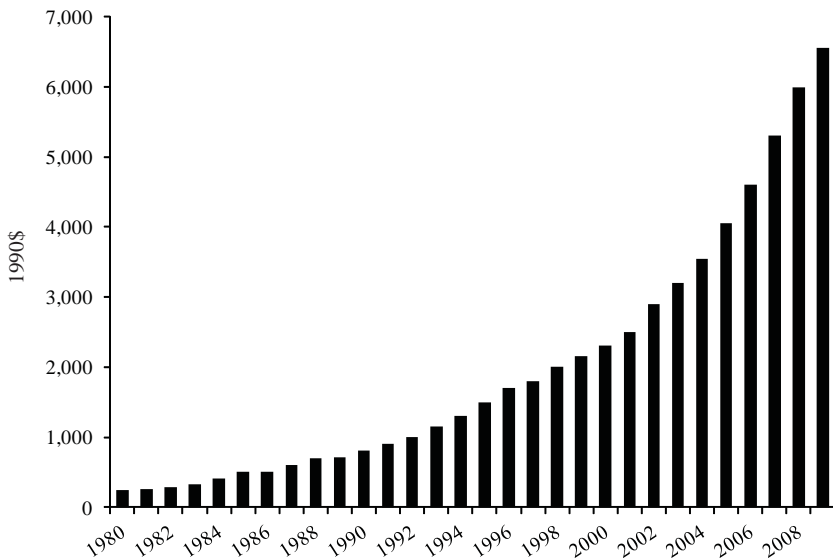
that the GDP per capita in 2011 is estimated at \$5,184 (IMF 2011). In short, as shown in Figure 7.3, most of the growth in China's per capita GDP occurred in the last 30 to 60 years.

Figure 7.4 provides a more detailed look at the rapid growth in per capita GDP that occurred recently using PPP-adjusted dollars. Using this measure, the figure shows that per capita GDP increased by a factor of 20 times over the period 1980–2009.

Observing income growth and productivity growth together helps provide a more complete picture of China's long-term economic progress. Here I focus on the income side, and for comparison I provide a measure for how much in terms of consumables a laborer earns for a day's labor.

Figure 7.5 provides a timeline showing real earnings in terms of meat and rice. In 1769, a day's labor earned a typical worker about 3 jins (China's unit of weight measurement as equivalent to pounds) of meat; in 1850 it was around 2 pounds. From then until 1973 a day's labor

Figure 7.4 China's Past Growth in per Capita GDP (in PPP-adjusted \$)



SOURCE: CIA (2010).

earned less than 2 jins. Currently, a typical Chinese laborer earns the equivalent of about 10 jins of meat per day, which implies that workers today are about 4 times as productive as the workers before 1973, even taking into consideration the rising prices. Rice as a measure followed a similar path, but beginning in 1973, the productivity increase is even greater, almost 10 times that before 1973.

What has caused such growth and progress in China? Many economists and commentators say it is due to the vast amount of cheap labor available in China. But, in fact, China's population has been declining as the share of the global population. In 1830, China had about 40 percent of the world's population. In 1913, China's population was one-third of the world's population. China now has roughly 1.4 billion

Figure 7.5 Real Earnings per Day for a Beijing Worker



NOTE: This figure is based on the assumption that the daily earning in 1769 was 77 Tongchien (copper dollar, currency unit in Qing Dynasty); in 1973 \$1 Chinese Yuan (Chinese dollar, Renminbi); and nowadays \$50 Chinese Yuan.

SOURCE: Various sources. The price indices in Qing Dynasty come from the files of Holland East Indian Company.

people, or about 20 percent of the global population. So the argument that China's vast and low-cost workforce is the main driving force of economic growth is well grounded. If such a labor force was available in the past, why didn't China experience growth earlier on? In addition, in 2011 the minimum wage in China was raised in most of the country by 21.7 percent, making China's labor force higher paid than several of its East Asian neighbors (BBC 2011). What is it, then, that propels such dynamic economic growth in China?

To understand the driving factor of economic growth of present-day China, let's consider a quote from a book published in Shanghai in 1914, *Finance in China* (Wagel 1914). The following excerpt, quoted then in the *New York Times*, highlighted the threat of China's economy to Western economies:

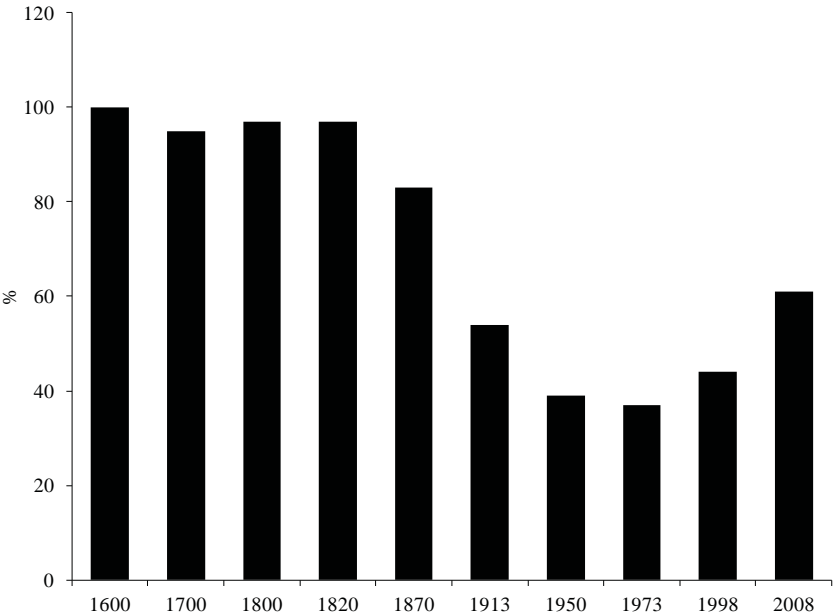
It is often said that the peril of today is not the Chinese behind the gun, but the Chinese as the manufacturers of guns and of many other things, equally calling for the highest technical skill. It has been the fashion of newspaper writers dealing with the development of China to state that the danger to the West lies in the industrial expansion of China, and it is averred that the Chinese, with their cheap labour and keen aptitude for imitation, competing with the dear labour and the heavy cost of transportation of the West, would certainly be able to beat the latter. (Wagel 1914, p. 291)

After the publication of Wagel's book, Western nations became nervous about China's rise because they thought that China would inevitably become economically dominant due to, as Wagel points out, its cheap labor relative to the West. However, such anxieties were sometimes seen as contributing factors that helped foment the Cultural Revolution, war, and other disruptions in China.

In what way is China different now from its past? Figure 7.6 shows the correlation between GDP growth and the population of China over several centuries to 2008.

Going back to 1600, the correlation between population and GDP growth was almost 100 percent. By 1820, the correlation remained very high, almost 97 percent. These high correlations were due to the fact that labor was the primary, if not the sole, factor of production. During that period, modern technology was practically nonexistent, production was almost exclusively labor intensive, therefore GDP grew in step with the population. It wasn't until the effects of the industrial revolution spread

Figure 7.6 Long-Term Trends: Correlation between China's Population and GDP Size



SOURCE: Maddison (2001).

to China in the latter part of the nineteenth century that the correlation declined. Production became more capital intensive, and hence the correlation between population and GDP declined. This decrease continued until after 1950 when it began to increase. The correlation grew more quickly beginning around 1973 as China began to take advantage of the trend of globalization and a freer trade environment.

Globalization opened up more of the Chinese economy to international markets mainly due to the establishment of the World Trade Organization (WTO), whose policies tend to benefit China more than other economies. This international order of trade that has been encouraged by Western industrialized economies is a key reason for China's economic success during the past 30 years.

In the seventeenth, eighteenth, and nineteenth centuries, the international order was based on a country's military power, which implied

a gunboat-based order rather than a rule-based order. The East India Company of the eighteenth century is an example of a successful practitioner of gunboat-based order. It maintained its own navy and military power, facilitating its participation in international trade. Eventually, technology developed during the industrial revolution in the Western nations spread to China, enabling it to transition from a gunboat-based economy to a rule-based economy. Today, rule-based order provides the basis for the entry of multinational corporations in China such as General Electric, whose army of lawyers help it conduct business.

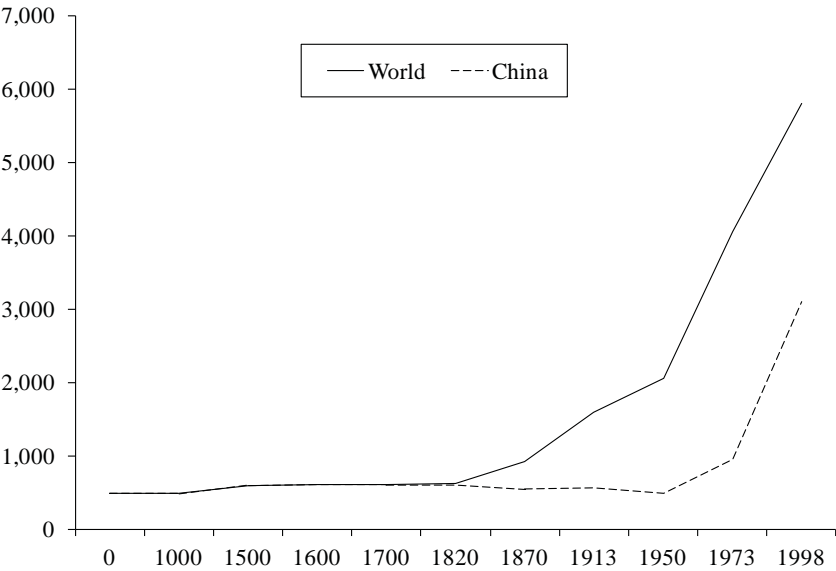
Gunboat-based and rule-based trade and investment have vast differences in transaction costs. For instance, employing lawyers is less expensive than maintaining a military force. Therefore, the transaction costs for trade today are less than during the gunboat-based age. This allows China to incur much lower transaction costs for trade today and serves as another reason why its economy is less encumbered and freer to grow.

Let's compare the reforms under Deng Xiaoping in 1978 with those made in the nineteenth century under the Qing Dynasty (1644–1911). During the Qing Dynasty, Li Hongzhang, a leading statesman, built military power that allowed China to become economically competitive. Without this power China would not have been able to engage, on a significant scale, in international trade and investment. On the other hand, Deng Xiaoping did not have to build military power to compete for trade. Instead he implemented market-oriented rules and regulations that attracted foreign direct investment and international trade.

Figure 7.7 shows the per capita GDP of China and the rest of the world from over 2000 years ago until the end of the twentieth century. As depicted by the steep slope of the line, China began gaining on the rest of the world after 1973, when globalization and the reforms implemented five years later began to have an impact.

As Wagel (1914) pointed out, China is sometimes characterized as having a keen ability to imitate new technologies that were developed by others, and the gains China has made since 1973 are due to such imitation. However, there are both pros and cons to this depiction. It is an advantage when countries only need to imitate in order to be able to pursue fast growth. However, such growth can also impede incentives to innovate and to conduct timely institutional reforms, so imitation can also be seen as a disadvantage.

Figure 7.7 Per Capita GDP: World vs. China



SOURCE: Maddison (2001).

Cost-saving manufacturing technologies developed in the twentieth century spread throughout the world in part due to policies implemented by the WTO. China became the major benefactor of this dispersal of technology. Still, there is another factor that helps to explain the success of China's economy in the last 30 years: the change in policies that affect the decision making on resource allocation and its control. China's economic policies are formulated in such a way that they are conducive to fast economic growth despite the fact that there are some negative side-effects that resulted, such as the dominance of state-owned enterprises (SOEs) in certain industries, environmental degradation, crowding-out of private property to the public sector, and substandard working conditions.

The rising pace of factor productivity growth can be attributed in part to overinvestment and the emergence of excess capacity in a number of important industries. China emerged as the world's largest steel producer in 1996 when its output reached 100 million metric tons, put-

ting it ahead of both the United States and Japan for the first time. The industry has continued to grow at a rapid pace. This is an example of the extent of China's industrialization and serves as just one example of an SOE that contributes substantially to the growth of its economy.

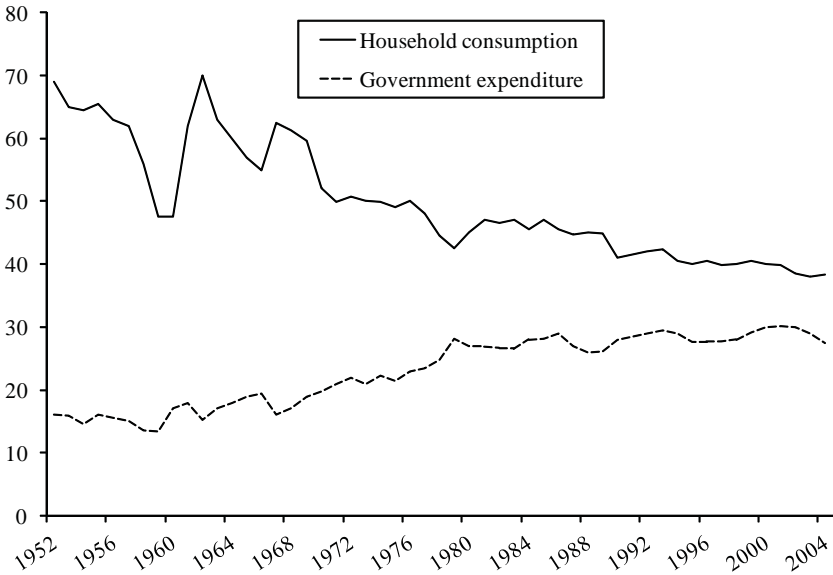
World Trade Organization membership had an immediate impact on Chinese economic growth, paving the way for more efficient day-to-day operations of Chinese corporations while reducing the risk premium investors applied to investment in the country. In addition, WTO membership established a powerful catalyst for a more serious approach to economic reform and industrial efficiency. As the benefits of those changes materialized, China achieved sustainable incremental economic growth while gradually reducing the risk premium of investment. This significantly cut the discount at which Chinese equities have traded against global market peers. As a major force driving the national economy of China, the fast expansion of SOEs has contributed significantly to China becoming the world's second-largest economy.

OWNERSHIP STRUCTURE OF PRODUCTIVE ASSETS

At the end of 2006, according to government records, land owned by the government was valued at 50 trillion RMB. At the same time, there were about 119,000 SOEs valued at about 29 trillion RMB. Therefore, the combined value of government land ownership plus SOEs amounted to 79 trillion RMB, which was roughly one-tenth of comparable U.S. government holdings. A few years later these values grew due to the expanding economy and land value appreciation. While at the end of 2006 state-owned assets were roughly 76 percent of the total national wealth in China, in 2010 that percentage likely declined to roughly 70 percent of the total national wealth because of the increasing trend toward privatization, particularly in the industrial sector.

Figure 7.8 shows a comparison of total government expenditures with total household expenditures in China as a percentage of GDP. In 1952, household consumption was about 69 percent of GDP, pretty close to today's household expenditures in the United States, which is roughly 71 percent of GDP. At the founding of the People's Republic of China, the economy was driven by household consumption. Over the

Figure 7.8 China's Household Consumption vs. Government Expenditure as a Percentage of GDP



SOURCE: Various sources.

years, during the planned economy period, this consumption declined so that now it is roughly 36 percent of GDP. Even in the reform period this share continues to decline. On the other hand, government expenditure as a percentage of GDP increased from 16 percent in 1952 to about 30 percent in the 2000s. Government expenditures as a share of GDP have almost doubled in the last 60 years, while private consumption expenditure as a percentage of GDP declined.

The government in China also has practically unchecked taxation power. To introduce a new tax or to raise tax rates, the government doesn't have to go through parliamentary debates. The ministry of finance and state council generally meet together and make new tax policy. It is somewhat daunting that a few people could simply gather in a room at the time of their choosing and make decisions that may alter the tax rates and policies of the world's second-largest economy. There is no accountability to the taxpayers. As a result, government

expenditures as the share of GDP, as the bold line depicts in the figure, trend upward.

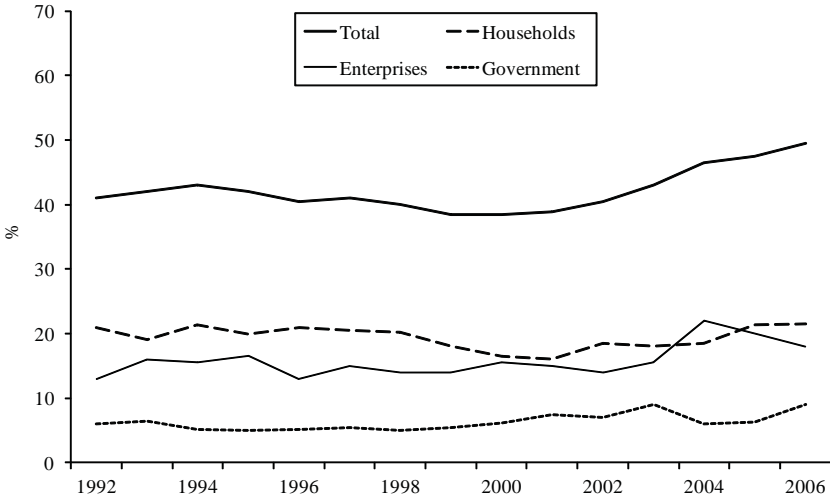
The Chinese government's budget was roughly 8 trillion RMB in 2010, which is about half of the U.S. annual government budget at the current exchange rate. But, if we use PPP, the Chinese budget may actually be bigger than the U.S. budget. The main question facing China's policymakers is how to spend that 8 trillion RMB. Social groups and political leaders are both influential in this decision. In China the political situation influences the distribution of resources, including how the budget is apportioned to different provinces and societies. Public accountability of the government budget spending is still waiting on establishment of the democratic institutions in China.

The growing concern among those tracking China's economy comes from the fact that SOEs, which were previously focused on manufacturing industries, are entering the financial industry, thereby expanding their influence further into the economy. They are doing so for two reasons: 1) it is useful for satisfying their own development needs and assures that they receive the financial support they need to grow, and 2) some SOEs see value in having a financial license or room for financial equity growth, and thus hope to profit from undertakings in finance. However, I believe that these two points, taken either individually or together, are not sufficient reasons to justify allowing SOEs' expansion into the financial domain.

SAVING

It is true that Chinese people generally save more of their income than people of other nationalities. As Figure 7.9 shows, the gross savings rate as a percentage of GDP rose from around 40 percent in 1992 to about 50 percent in 2006. However, looking at just the household sector's savings as a percentage of GDP, there is little variation over that period of time, staying at about 20 percent, although trending slightly upward in the 2000s. This relatively steady rate is due mainly to the fall in the share of household income as a share of national income rather than a decline in the household savings rate (Prasad 2009).

Figure 7.9 Household, Enterprise, and Government Savings as a Percentage of GDP, China, 1992–2006

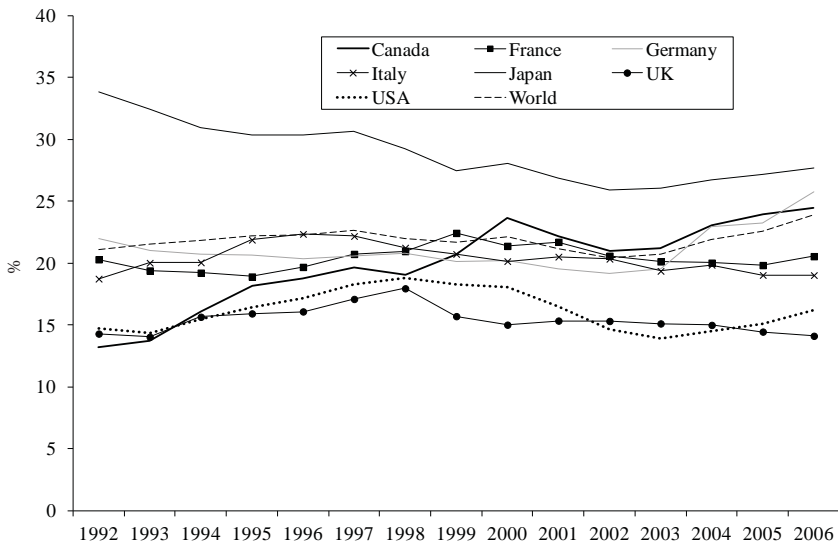


SOURCE: China Statistical Yearbook (1995–2009). Flow of Funds Accounts.

Savings by SOEs has been more evident. Beginning in 2003, SOEs' savings rate as a percentage of GDP jumped sharply from about 15 percent to over 20 percent before falling back slightly. The SOEs are not subject to monitoring by the National People's Congress or other governmental agencies, and they are not required to redistribute profits or remit them to the Ministry of Finance. Their profits and increased value are not translated into consumption since households do not receive these benefits. The same is true for the sales of land and SOEs themselves, the proceeds of which go to the government treasury. Government saving also increased gradually to about 9 percent from a steady 5 percent seen throughout the 1990s.

Figure 7.10 shows gross savings as a percentage of GDP in seven other industrialized nations—including the United States—and the world overall. Note that, over the same period of 1992–2006, the rate ranges from a low of 13.3 percent (in Canada in 1992) to a high of 33.8 percent (in Japan, also in 1992). The U.S. rate ranges from a low of 14.4 percent in 1993 to a high of 18.8 percent in 1998 (EconStats 2012).

Figure 7.10 Gross Savings as a Percentage of GDP, Seven Countries plus the World, 1992–2006



SOURCE: EconStats (2012).

Therefore, it is apparent that China's gross savings rate is quite high relative to other large nations, which is one reason why its policymakers are encouraging domestic consumption, which has not been growing as fast as GDP, as a means of rebalancing the nation's growth and reducing its account surplus.

SUMMARY

China's economy is mainly investment and export driven as opposed to being driven by domestic consumption like the U.S. economy is. Because of that, the consequences are that the economy is too dependent on these sectors. It also finds itself overly dependent on energy-intensive industries and insufficiently so on the service sector. Transitioning to a more balanced economy, one in which private consumption

plays a greater role, will be a challenge for China's economic policy-makers. Because of the political pressure applied by the vested interest group who benefit from the current policies, there is no incentive for them to alter policy in order to transition to a more balanced economy. Other problematic consequences resulting from how China's economy has developed include the crowding out of private firms in industries in which SOEs became dominant players and barriers to legal development and the rule of law in the economy.

Still, the current model for economic growth in China will likely continue despite recessions and other economic uncertainty worldwide. In fact, these issues emphasize the importance of a highly coordinated state-controlled economy, particularly the rising influence of SOEs through state-owned banks and other financial institutions.

To summarize, the economic benefits accrued as a result of the industrial revolution have been completely absorbed into China's economy, as have the benefits from the international movement of investment and capital. China's current growth may be attributed mainly to government sector involvements in the economy. Risks remain, however. These include being overly reliant on the government-dominated economic model, the ascending SOEs and the power they continue to amass, an increasingly tougher environment for private and foreign firms to operate freely in, and the fact that local governments are becoming major borrowers from banks.

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